

BYALIK, Gavriil Iosifovich; ~~HERO~~, A.I., redaktor; DZHIGIT, I.S., redaktor;  
KULIKOVSKIY, A.A., redaktor; SMIRNOV, A.D., redaktor; TARASOV, F.I.,  
redaktor; TRAMM, B.F., redaktor; CHECHIK, P.O., redaktor; SHAMSHUR,  
V.I., redaktor; KRIVOSHEYEV, M.I., redaktor; SKVORTSOV, I.M., te-  
khnicheskiy redaktor.

[Broadband amplifiers] Shirekopelesnye usiliteli. Izd. 2-oe, perer.  
Moskva, Gos. energ. izd-vo, 1956, 110 p. (Massovaya radiobiblioteka  
no.240) (Amplifiers, Electron-tube) (MLRA 9:5)

~~BERG~~, A.I., akademik, redaktor; DEHICHT, I.S., professor, redaktor;  
KLYAUS, Ye.M., redaktor; POLYAKOVA, T.V., tekhnicheskii redaktor

[Radio and electronics and their technical application] Radio-  
tekhnika i elektronika i ikh tekhnicheskoe primeneniye. Moskva,  
1956. 127 p. (MIRA 9:3)

1. Akademiya nauk SSSR  
(Radio) (Electronics)

BERG, A. I. Admiral

"Problems in the Development of Radioelectronics," Red Star, 13 Jan 56, pp 3-4.

BERG, A. I.

"A report by Academician A. I. Berg entitled "The Development of Radio-Electronics in the USSR and Abroad" touched on all aspects of present-day radio engineering, the state of the technology of semi-conductors, and the tasks which have to be accomplished by the industry and by scientific workers.

given at the conference on the Technology of Dielectrics and Semiconductors, Leningrad Electrotech. Inst. im. Ul'yanov (Lenin), June 1956.

Sum 1239

BERG, A.<sup>L</sup> Eng. Admira., MBr. Academy

"Problems of Development of Radioelectronics," from the book Modern Military Technology, 1956, page, 134.

Translation 1114585

BERG, A. I.

CHECHIK, Petr Oskarovich; BERG, A.I., redaktor; DZHIGIT, I.S., redaktor  
KULIKOVSKIY, A.A., redaktor; SMIRNOV, A.D., redaktor TRAMM, B.F.,  
redaktor; SHAMSHUR, V.I., redaktor; TARASOV, F.I., redaktor; VORONIN,  
K.P., tekhnicheskiy redaktor

[New sources of current for radio apparatus] Novye istochniki pitaniia  
radioapparaturny. Moskva, Gos. energ. izd-vo, 1956. 39 p. (Massovaya  
radiobiblioteka, no.257) (MLRA 10:5)  
(Radio--Apparatus and supplies) (Electric batteries)

DE NG, H. I.  
ZAGIK, Semen Yefimovich; KAPCHINSKIY, Lev, Mikhaylovich; BERG, A.I.,  
redaktor; DZHIGIT, I.S., redaktor; KULIKOVSKIY, A.A., redaktor;  
SMIRNOV, A.D., redaktor; TARASOV, P.I., redaktor; TRANH, B.P., redaktor;  
CHECHIK, P.O., redaktor; SHAMSHUR, V.I., redaktor; OVCHARENKO, Ye.  
P., redaktor; VORONIN, K.P., tekhnicheskyy redaktor

[Television reception antennas] Priemnye televizionnye anteny.  
Moskva, Gos. energ. izd-vo, 1956. 47 p. (MLRA 10:4)  
(Television--Antennas)

BERG, A.I.

MIKHLIN, Berka Zys'yevich; BERG, A.I.,redaktor; DZHIGIT, I.S.,redaktor;  
KULIKOVSKIY, A.A.,redaktor; SMIRNOV, A.D.,redaktor; TARASOV, P.I.,  
redaktor; TRAMM, B.F.,redaktor; CHECHIK, P.O.,redaktor;  
SHAMSHUR, V.I.,redaktor; GINZBURG, Z.B.,redaktor; CHERNOV, V.S.,  
tekhnicheskiiy redaktor

[Electronic instruments for production control] Radioelektronnye  
pribory dlia proizvodstvennogo kontrolya. Moskva, Gos. energ.  
izd-vo, 1956. 62 p. (Massovaya radiobiblioteka, no.258)  
(Automatic control) (Electronic instruments)  
(Production control)



*BERG, A.I.*

USSR / Radiophysios. General Problems.

I-1

Abs Jour : Ref Zhur - Fizika, No 5, 1957, No 12411

Author : Berg, A.I.

Inst : Not given

Title : Tasks of the Higher School in the Development of Radio Electronics.

Orig Pub : Radiotekhn. i elektronika, 1956, 1, No 6, 689-694

Abstract : An abbreviated text of a report made at the Scientific Conference on Radio Physics and Radio Electronics in Gor'kiy 16 January 1956.

Card : 1/1

BERG, A. , Academician

"The Forces of Socialism are Inexhaustible." The Soviet Artificial Earth Satellite, 1957, p. 30.

*BERG, A.I.*  
LEVANDOVSKIY, Boris Andreyevich; BERG, A.I., red.; DZHIGIT, I.S., red.;  
KULIKOVSKIY, A.A., red.; SMIRNOV, A.D., red.; TARASOV, F.I., red.;  
TRAMM, B.F., red.; CHECHIK, P.O., red.; SHAMSHUR, V.I., red.;  
SOBOLEVSKIY, A.G., red.; CHERNOV, V.S., tekhn.red.

[Portable ultrashort wave radio station] Perenosnaya UKV radio-  
stantsiya. Moskva, Gos.energ.izd-vo, 1957. 31 p. (Massovaya  
radiobiblioteka, no.278) (MIRA 10:11)  
(Radio--Receivers and reception) (Radio--Transmitters and transmission)

KUPRIYANOVICH, Leonid Ivanovich.; BERG, A.I., redaktor. DZHIGIT, I.S.,  
redaktor; KULIKOVSKIY, A.A., redaktor; SMIRNOV, A.D., redaktor;  
TARASOV, F.I., redaktor. TRAMM, B.F., redaktor; CHECHIK, M.O.,  
redaktor; SHANSHUR, V.I., redaktor; TARASOV, F.I., redaktor;  
VORONIN, K.P., tekhnicheskiy redaktor.

[Pocket transceivers] Karmannye radiostantsii. Moskva, Gos.energ.  
izd-vo, 1957. 31 p. (Massovaya radiobiblioteka, no.267)

(MLRA 10:6)

(Radio--Apparatus and supplies)

YAKOVLEV, Valeriy Vladimirovich; BERG, A. I., redaktor; DZHIGIT, I.S.,  
redaktor; KULIKOVSKIY, A.A., redaktor; SMIRNOV, A.D., redaktor;  
TARASOV, F.I., redaktor; CHECHIK, P.O., redaktor, SHAMSHUR, V.I.,  
redaktor; PLENKIN, Yu.N., redaktor; MEDVEDEV, L.M., tekhnicheskii  
redaktor.

[Amateurs' receiving sets using transistors] Liubitel'skie priemniki  
na poluprovodnikovyykh triodakh. Moskva, Gos.energ.izd-vo, 1957. 39 p.  
(Massovaya radiobiblioteka, no.275) (MIRA 10:11)  
(Radio--Receiver and reception) (Transistors)

BERG, A.I.

TARASOV, F.I.; BERG, A.I., redaktor; DZHIGIT, I.S., redaktor; KULIKOVSKIY, A.A., redaktor; SMIRNOV, A.D., redaktor; TARASOV, F.I., redaktor; TRAMN, B.F., redaktor; CHECHIK, P.O., redaktor; SHANSHUR, V.I., redaktor; YENYUMIN, V.V., redaktor; MEDVEDEV, L.Ya., tekhnicheskiy redaktor

[Diagrams of low-frequency amplifiers for amateurs] Skhemy radioliubitel'skikh usilitelei nizkoi chastoty. Moskva, Goh. energ. izd-vo, 1957. 61 p. (Massovaya radiobiblioteka, no. 264)  
(MLRA 10:4)

(Amplifiers, Electron-tube)

*BERG A.I.*

GRUDINSKAYA, Galina Petrovna; ~~BERG~~ A.I., red.; DZHIGIT, I.S., red.;  
KULIKOVSKIY, A.A., red.; SMIRNOV, A.D., red.; TARASOV, F.I., red.;  
CHECHIK, P.O., red.; SHAMSHUR, V.I., red.; LARIONOV, G.Ye., tekhn. red.

[Ultra-short radio wave propagation] Rasprostraneniye ul'trakorotkikh  
radiovoln. Moskva, Gos.energ.izd-vo, 1957. 62 p. (Massovaya radio-  
biblioteka, no.281) (MIRA 10:12)

(Radio, Shortwave)

BERG, A.I.

KAZARYAN, Rafael' Avetisovich; KUVSHINOV, Boris Ivanovich; NAZAROV, Mikhail Vasil'yevich, BERG, A.I., redaktor; DZHIGIT, I.S., redaktor; KULIKOVSKIY, A.A., redaktor; SMIRNOV, A.D., redaktor; TARASOV, F.I., redaktor; TRAMM, B.F., redaktor; CHECHIK, P.O., redaktor; SHAMSHUR, V.I., redaktor; KHARKEVICH, A.A., redaktor; MEDVEDEV, L. Ya., tekhnicheskii redaktor

[Elements of the general theory of communications] Elementy obshchei teorii svyazi. Moskva, Gos. energ. izd-vo, 1957.  
94 p. (Massovaya radiobiblioteka, no.263) (MLRA 10:4)  
(Telecommunication)



BERG, A.I.

BROYDE, Abram Markovich, ; TARASOV, F.I., redaktor; ~~BERG, A.I.~~, redaktor;  
DZHIGIT, I.S., redaktor. KULIKOVSKIY, A.A., redaktor; SMIRNOV, A.D.,  
redaktor,; TRAMM, V.F., redaktor, ;CHECHIK, P.O., redaktor; SEAMSHUR,  
V.I., redaktor; FRIDKIN, A.M., tekhnicheskii redaktor.

[Handbook on electron tube and semiconductor apparatus] Spravochnik po  
elektrovakuumnym i poluprovodnikovym priboram. Moskva, Gos.energ.izd-  
vo, 1957. 175 p. (Massovaya radiobiblioteka, no.269) (MLRA 10:5)  
(<sup>A</sup>electronic apparatus and appliances)

107-57-1-2/60

AUTHOR: Academician A.I. Berg, Academician B.A. Vvedenskiy, Academician S.A. Vekshinskiy, Academician V.A. Kotel'nikov, Corresponding Member AS USSR A.L. Mints, Corresponding Member AS USSR A.A. Pistol'kors, Corresponding Member AS USSR V.I. Siforov

TITLE: Search, Dare, Create (Ishchite, derzayte, tvorite)

PERIODICAL: Radio, 1957, Nr 1, p 1 (USSR)

ABSTRACT: This is an open letter, an appeal to radio amateurs to experiment boldly, to create new designs, to promote new ideas in application of radio and electronics in industry, farming, transportation, and communication. The role of radio amateurism as a preparatory school for radio specialists in industry is noted. Achievements of radio and electronics are considered as a basis of development of all sciences, production, and even planning. Radio amateurs are urged to search, to dare, and to create.

AVAILABLE: Library of Congress

Card 1/1

*Berg, A.I.*

AUTHOR: Berg, A.I., Academician 4-11-9/34

TITLE: Young Friends (Yunyye druz'ya)

PERIODICAL: Znaniye - Sila, 1957, # 11, p 9 (USSR)

ABSTRACT: The author states that during centuries the endeavors of scientists have been directed to achieve an increase in the productiveness of physical work. This has resulted in technical progress. He refers to electronics which have opened possibilities for an increase of intellectual labor on a scale unheard of before. The author has been working in the field of radio-electronics for about 40 years, and states that the speed of its development has considerably outrun that of the adjoining fields of science. There is 1 figure.

AVAILABLE: Library of Congress

Card 1/1

ANDREYEV, Igor' Vasil'yevich, ~~HERO~~, A.I., red.; BURLYAND, V.A., red.;  
VANYEV, V.I., red.; GENISHTA, Ye.M., red.; DZHIGIT, I.S., red.;  
KANAYEVA, A.M., red.; KHEMKEL', B.T., red.; KULIKOVSKIY, A.A., red.;  
SMIRNOV, A.D., red.; TARASOV, F.I., red.; CHECHIK, P.O., red.; SHAMSHUR,  
V.I., red.; GANZBURG, M.D., red.; MEDVEDEV, I.Ye., ~~tekh.~~ red.

[Cabinet designs for radio receivers] Vneshee ofornenie priemnika.  
Moskva, Gos. energ. izd-vo, 1958. 46 p. (MIRA 11:8)  
(Radio--Receivers and reception)

MEERSON, Anatoliy Meyerovich, BERG, A.I., red.; BURGLYAND, V.A., red.;  
VANAYEV, V.I., red.; GENISHTA, Ye.N., red.; DZHIGIT, I.S., red.;  
KANAYEVA, A.M., red.; KHENKEL', E.T., red.; KULIKOVSKIY, A.A., red.;  
SM IRNOV, A.D., red.; TARASOV, F.I., red.; CHECH'K, P.O., red. [deceased]  
SHAMSHUR, V.I., red.; BORUNOV, N.I., tekhn.red.

[Testing radio tubes] Ispytanie radiolamp. Moskva, Gos. energ.  
izd-vo, 1958. 61 p. (Massovaya radiobiblioteka, no.303) (MIRA 11:9)  
(Electron tubes--Testing)

KUCUSHEV, Aleksandr Mikhaylovich.; BERO, A.I., red.; BURDEYNYI, F.I., red.;  
BURLYAND, V.A., red.; VANEYEV, V.I., red.; GENISHTA, Ye.N., red.;  
DZHIGIT, I.S., red.; KANAYEVA, A.M., red.; KRENKEL', E.T., red.;  
KULIKOVSKIY, A.A., red.; SMIRNOV, A.D., red.; TARASOV, F.I., red.;  
CHECHIK, P.O., red.; SHAMSHUR, V.I., red.; BORUNOV, N.I., tekhn. red.

[Modern radio electronics] Sovremennaya radioelektronika. Moskva,  
Gos. energ. izd-vo, 1958. 62 p. (Massovaya radiobiblioteka, no. 300).

(MIRA 11:11)

(Electronics)

SOBOLEVSKIY, Anatoliy Georgiyevich.; ~~BERG, A.I., red.~~; BURLYAND, V.A., red.;  
VANKEV, V.I., red.; GENISHTA, Ye.N., red.; DZHIGIT, I.S., red.;  
KANAYEVA, A.M., red.; KRENKEL', E.T., red.; KULIKOVSKIY, A.A., red.;  
SMIRNOV, A.D., red.; TARASOV, F.I., red.; SHAMSHUR, V.I., red.;  
KRIBITSKIY, B.Kh., red.; LARIONOV, G.Ye., tekhn. red.

[Pulse techniques] Impul'snaya tekhnika. Moskva, Gos. energ. izd-vo,  
1958. 167. (Massovaya radiobiblioteka, no. 308). (MIRA 11:11)  
(Pulse techniques(Electronics))

*BERG, A. I.*

BERG, A.I., akademik.

~~Soviet~~ sputniks and radio electronics. Radio no.1:3-5 Ja '58.  
(Artificial satellites) (Radio, Shortwave) (MIRA 11:1)



BERG, Aksel' Ivanovich, akademik; FAYNBOYM, I.B., red.; ATROSECHENKO,  
D.Ye., tekhn.red.

[A.S.Popov, radioelectronics, and progress] A.S.Popov, radio-  
elektronika i progress. Moskva, Izd-vo "Znanie," 1959. 29 p.  
(Vsesoiuznoe obshchestvo po rasprostraneniui politicheskikh i  
nauchnykh znani. Ser.9, Fizika i khimiia, no.14)

(MIRA 12:7)

(Popov, Aleksandr Stepanovich, 1859-1905)  
(Radio)

POPOV, Aleksandr Stepanovich [deceased]; RADOVSKIY, M.I.; BERG, A.I.,  
red.; KARASEV, M.D., red.; AKHLAMOV, S.N., tekhn.red.

[Wireless telegraphy; collection of articles, reports, letters,  
and other materials] O besprovolochnoi telegrafii; sbornik  
statei, dokladov, pisem i drugikh materialov. Pod red. i so  
vstup.stat'ei A.I.Berga. S primechaniami M.I.Radovskogo.  
Moskva, Gos.izd-vo fiziko-matem.lit-ry, 1959. 218 p. (MIRA 12:12)  
(Telegraph, Wireless)

9 (2)

SOV/107-59-3-6/52

AUTHOR: Berg, A.I., Academician, Laureate of the Gold Medal  
imeni A.S. Popov

TITLE: The Basis for Technical Progress (Osnova tekhnicheskogo progressa)

PERIODICAL: Radio, 1959, Nr 3, pp 8 - 9 (USSR)

ABSTRACT: On the occasion of the 100 anniversary of A.S. Popov's birthday, the author reviews the application of radio electronics in sciences, astronomy, optics, medicine and biology. In conclusion the author points out that electronic instruments are highly reliable and possess high efficiency factors. Therefore they will find large-scale application in the automation of production processes, not only of single machine tools, but of entire manufacturing departments. Electronic computer engineering has an important place in this development. Computers will control production

Card 1/2

SOV/107-59-3-6/52

. The Basis for Technical Progress

processes, they will determine the most favorable technological conditions and may also be used for statistical and/or book keeping purposes. There is one photograph of A.I. Berg.

Card 2/2

POPOV, Petr Aleksandrovich; BERG, A.I., red.; BURDEYNYY, F.I., red.;  
BURLYAND, V.A., red.; VANEYEV, V.I., red.; GENISHTA, Ye.H.,  
red.; DZHIGIT, I.S., red.; KANAYEVA, A.M., red.; KRENKEL',  
E.T., red.; KULIKOVSKIY, A.A., red.; SMIRNOV, A.D., red.;  
TARASOV, F.I., red.; SHAMSHUR, V.I., red.; KULIKOVSKIY, A.A.,  
red.; LARIONOV, G.Ye., tekhn. red.

[Design of audio frequency transistor amplifiers] Raschet  
tranzistornykh usilitelei zvukovoi chastoty. Moskva, Gos.  
energ. izd-vo, 1960. 103 p. (Massovaya radiobiblioteka, no.378)  
(MIRA 14:5)

(Transistor amplifiers)

BERG, A.I., akademik, red.; VODOLAZSKIY, L.A., red.; SHAMSHUR, V.I.,  
red.; LARIONOV, G.Ye., tekhn.red.

[Electronics in medicine] Elektronika v meditsine. Pod red.  
A.I.Berga. Moskva, Gos.energ.izd-vo, 1960. 391 p.  
(MIRA 14:2)

1. Akademiya nauk SSSR. Vsesoyuznyy nauchnyy soviet po radio-  
fizike i radiotekhnike.  
(ELECTRONICS IN MEDICINE)

S/142/60/000/01/001/022  
E140/E463

AUTHOR: Berg, A.I.

TITLE: Electronics and Cybernetics <sup>1b</sup>

PERIODICAL: Izvestiya vysshikh uchebnykh zavedeniy, Radiotekhnika,  
1960, Nr 1, pp 3-12 (USSR)

ABSTRACT: A shortened text of a lecture given at the Faculty of  
Automation and Computing Technique of the Moscow 'Order of Lenin'  
Power Engineering Institute in September, 1959.

The lecture contains well-known generalities on  
cybernetics dealing with theory of information, one page;  
application of cybernetics in biology, two pages;  
application of cybernetics in linguistics, half a page;  
application in sociology and economics, one page (this is  
the first reference in Soviet literature known to the  
abstractor in which the term sociology is used without  
denunciation); application in industry, one page.  
In conclusion the author calls for the establishment of  
a school of "Soviet Cybernetics, free of the errors of  
bourgeois science" (in the author's words).

SUBMITTED: October 22, 1959

Card 1/1 Chair of Automatics and Telemechanics, Moscow OL Power Engineering Inst. ✓

BERG, A. I.

"On Certain Problems of Cybernetics," Voprosy filosofii [Problems of Philosophy],  
1960, No. 5, Pages 51 - 62.



BERG, A.I., akademik

Reliability is the most important factor in the progress of  
electronics. Radio no.7:39-41 J1 '60. (MIRA 13:7)  
(Electronic industries--Quality control)

BERG, A., akademik

Reliability and technological development. NTO 2 no.5:4-6 My '60.  
(MIRA 14:5)

(Russia--Economic policy)

SIFOROV, V.; BERG, A.I., akademik; MINTS, A.L., akademik; KUGUSHEV, A.M.,  
doktor tekhn.nauk, prof.

Supporting the appeal of chemists. NTO 2 no.5:38 My :60.  
(MIRA 14:5)

1. Chlen-korrespondent Akademii nauk SSSR, predsedatel' TSentral'nogo  
pravleniya nauchno-tekhnicheskogo obshchestva radiotekhniki i elektro-  
svyazi im. A.S.Popova (for Siforov). 2. Chleny TSentral'nogo pravleniya  
nauchno-tekhnicheskogo obshchestva radiotekhniki i elektrosvyazi im.  
A.S.Popova (for Berg, Mints). 3. Predsedatel' Moskovskogo oblastnogo  
pravleniya nauchno-tekhnicheskogo obshchestva radiotekhniki i  
elektrosvyazi im. A.S.Popova (for Kugushev).  
(Technical societies) (Radio research)

S/029/60/000/010/002/006  
B024/B067

AUTHOR: Berg, A. I., Academician

TITLE: Problem Number One - Dependability<sup>25</sup>

PERIODICAL: Tekhnika molodezhi, 1960,<sup>28</sup> No. 10, pp. 7-10

TEXT: The author discusses the problem of improving the quality<sup>14</sup> of industrial products, above all dependability. The entire evolution of mankind is an imitation of nature, which eventually led to the technical imitation of the human brain - to molecular electronics. The cooperation between man and automatic machines is very important since the limitation of the man's psychic possibilities may become particularly dangerous when the automatic machine fails. The problem of dependability includes a large number of complicated problems, e.g., the development of a complex system that is more dependable than its components, and the development of analogies, models, and directions describing in a simplified form the complex system which must be reliably controlled. ✓

Card 1/1

BERG, A.I., akademik; GREGOR, Jiri [translator]

On some problems of cybernetics. Pokroky mat fyz astr 5  
no.6:734-741 '60.

BERG, A. I. (Academician)

"Problems of Control and Cybernetics."

1. From Lenin to Our Own Times
2. From Mechanization to Cybernetics
3. On Certain Philosophical Problems of Cybernetics

Filosofskiye voprosy kibernetiki (Philosophical Problems of Cybernetics),  
Publishing House of Socio-Economic Literature, Moscow 1961 392 p.

BERG, A.I. (Moskva); KITOV, A.I. (Moskva); LYAPUBOV, A.A. (Moskva)

Possibilities of automating the management of the national economy.  
Probl. kib. no.6:83-100 '61. (MIRA 15:1)  
(Economics, Mathematical) (Electronic calculating machines)

BERG, A. I. and LYAPUNOV, A. A. (Prof.)

"On Prospects of Utilization of Computers in the Government Organization"

presented at the All-Union Conference on Computational Mathematics and  
Computational Techniques, Moscow, 16-28 November 1961

So: Problemy kibernetiki, Issue 5, 1961, pp 289-294



BERG, A.I., akademik, red.; SHAMSHUR, V.I., red.; LARIONOV, G.Ye., tekhn.  
red.

[Cybernetics in the service of communism] Kibernetiku na sluzhbu  
kommunizmu; sbornik statei. Vol.1. 1961. 311 p. (MIRA 14:12)  
(Cybernetics)

S/194/61/000/011/C30/070  
D256/D302

AUTHOR: Berg, A.I.

TITLE: Cybernetics and certain technical problems of national economy control

PERIODICAL: Referativnyy zhurnal. Avtomatika i radioelektronika, no. 11, 1961, 43-44, abstract 11 V355 (Vopr. filozofii, 1961, no. 2, 11-24, 183 (summary in English))

TEXT: It is pointed out that steps are being taken in the USSR to introduce during the next few years a wide use of modern computers and other methods of obtaining information and its treatment and distribution. Machines and systems for automation of industrial production and mechanization of work of technical-engineering and administrative staffs are being developed and introduced into various branches of the national economy. New types of computers are developed as well as systems for analyses of economy, planning, statistics and accountancy. Wide studies are being conducted in the

Card 1/2

Cybernetics and certain technical...

S/194/61/000/011/030/070  
D256/D302

USSR concerning the development of new methods of management, introduction of standard structures of management, methods of standardization of the number of administrative staff, and also the development of industrial management based upon mechanization and automation of technical-engineering and administrative-managerial processes. The development of radio electronics is reviewed as the technical foundation of scientific control organization, i.e. cybernetics. [Ab-  
stracter's note: Complete translation]

Card 2/2

POSPELOV, P.N., akademik; MINTS, A.L., akademik; ALEKSANDROV, A.P.,  
akademik; FEDOSEYEV, P.N., akademik; LAVRENT'YEV, M.A., akademik;  
BERG, A.I., akademik; PETROVSKIY, I.G., akademik; SIDORENKO, A.V.;  
SKRYABIN, G.K., kand.biolog.nauk; KONSTANTINOV, B.P., akademik;  
GOLUNSKIY, S.A.; SHUBNIKOV, A.V., akademik; BLOKHINTSEV, D.I.;  
DORODNITSYN, A.A., akademik; KEDROV, B.M.; SISAKYAN, N.M., akademik

Discussing the reports. Vest. AN SSSR 31 no.12:49-66 D '61.  
(MIRA 14:12)

1. Chleny-korrespondenty AN SSSR (for Sidorenko, Golunskiy,  
Blokhtsev, Kedrov).

(Research)

BERG, A.I., akademik; ARUTYU CV, V.O., prof.

Necessary condition for scientific progress. Vest. AN SSSR 31  
no. 2:11-15 F '61. (MIR 14:2)

(Science)

BERG, A., akademik

The union of mathematics and electronics. Radio no.6:8-9  
Je '62. (MIRA 15:5)  
(Electronics) (Communism)

ARZUMANYAN, A.A., akademik; BERG, A.I., akademik; ZHUKOV, Ye.M., akademik;  
SEMENOV, N.B., akademik; VINOGRADOV, V.V., akademik; FRANTSEV, Yu.P.;  
SHCHERBAKOV, D.I., akademik; ANISIMOV, I.I.; GATOVSKIY, L.M.;  
IOVCHUK, M.T.; FEDOSEYEV, P.N., akademik; ROMASHKIN, P.S.; KONSTANTINOV,  
F.V.; MITIN, M.B., akademik; YELYUTIN, V.P.; PLOTNIKOV, K.N.;  
PRUDENSKIY, G.A.; YUDIN, P.F., akademik; RYBAKOV, B.A., akademik;  
KONSTANTINOV, B.P., akademik; KHVOSTOV, V.M.; KEDROV, B.M.; MARKOV,  
A.A.; BAISHEV, S.B., akademik; ALEKSEYEV, M.N., prof.; SKAZKIN, S.D.,  
akademik; ALEKSANDROV, A.D.; POSPELOV, P.N., akademik

Discussion of L.F. Il'ichev's report. Vest. AN SSSR 32 no.12:19-50  
D '62. (MIRA 15:12)

1. Chleny-korrespondenty AN SSSR (for Aleksandrov, Frantsev,  
Anisimov, Gatovskiy, Iovchuk, Romashkin, Konstantinov, Yelyutin,  
Plotnikov, Prudenskiy, Khvostov, Kedrov, Markov). 2. AN Kazakhskoy  
SSR (for Baishev).

(Research)

BERG, A.I., glav. red.; TRAPEZNIKOV, V.A., glav. red.; BERNOVICH, D.M.,  
 zam. glav. red.; LERNER, A.Ya., doktor tekhn. nauk, prof.,  
 zam. glav. red.; AVEN, O.I., red.; AGEYKIN, D.I., red.; kand.  
 tekhn. nauk, dots., red.; AYZERMAN, M.A., red.; VENIKOV, V.A.,  
 doktor tekhn. nauk, prof., red.; VORONOV, A.A., doktor tekhn.  
 nauk, prof., red.; GAVRILOV, M.A., doktor tekhn. nauk, prof.,  
 red.; ZERNOV, D.V., red.; IL'IN, V.A., doktor tekhn. nauk,  
 prof., red.; KITOV, A.I., kand. tekhn. nauk, red.; KOGAN, B.Ya.,  
 doktor tekhn. nauk, red.; KOSTOUSOV, A.I., red.; KHLINITSKIY,  
 N.A., kand. fiz.-mat. nauk red.; LEVIN, G.A., prof. red.;  
 LOZINSKIY, M.G., doktor tekhn. nauk, red.; LOSSIYEVSKIY, V.I.,  
 red.; MAKSAREV, Yu.Ye., red.; MASLOV, A.A., dots., red.; POPOV, A.A., red.;  
 RAKOVSKIY, M.Ye., red.; ROZENBERG, L.D., doktor tekhn. nauk,  
 prof., red.; SOTSKOV, B.S., red.; TIMOFEYEV, P.V., red.;  
 USHAKOV, V.B., doktor tekhn. nauk, red.; FEL'DBAUM, A.A.,  
 doktor tekhn. nauk, prof., red.; FROLOV, V.S., red.;  
 KHARKEVICH, A.A., red.; KHRAMOV, A.V., kand. tekhn. nauk, red.;  
 TSYPKIN, Ya.Z., doktor tekhn. nauk, prof., red.; CHELYUSTKIN,  
 A.B., kand. tekhn. nauk, red.; SHREYDER, Yu.A., kand. fiz.-  
 mat. nauk, dots., red.; BOCHAROVA, M.D., kand. tekhn. nauk,  
 starshiy nauchnyy red.; DELONE, N.N., inzh., nauchnyy red.;  
 BARANOV, V.I., nauchnyy red.; PAVLOVA, T.I., tekhn. red.  
 (Continued on next card)



BERG, A.I.— (continued). Card 2.

[Industrial electronics and automation of production processes] Avtomatizatsiia proizvodstva i promyshlennaya elektronika. Glav. red. A.I.Berg i V.A.Trapeznikov. Moskva, Gos.nauchn. izd-vo "Sovetskaya Entsiklopediya." Vol.1. A - I. 1962. 524 p. (MIRA 15:10)

1. Chlen-korrespondent Akademii nauk SSSR (for Sotskov, Kharkevich, Zernov, Timofeyev, Popkov).  
(Automatic control) (Electronic control)

S/026/62/000/007/002/005  
D050/D113

AUTHOR: Berg, A.I., Academician

TITLE: A science of immense potentialities

PERIODICAL: Priroda, no. 7, 1962, 16-22

TEXT: The author describes the nature of cybernetics and deals with the need for introducing cybernetic methods in Soviet industry and science. It is planned to reorganize the whole national economic system by establishing a network of efficient computing centers, equipped with super-highspeed electronic computers, connected with planning, financing, transport, and industrial organizations through a united system of technological automatic communication. This will enable leading organizations to receive in due time true information on the present state and trend of development of the country's national economy and to take necessary control measures. In industrial processes, automatic control devices are now beginning to produce high-quality final products in the shortest possible time and in the most advantageous way. Appropriate theoretical methods have been developed by the

Card 1/2

S/026/62/000/007/002/005  
D050/D113

A science of immense potentialities

school of Academician L.S. Pontryagin, and by Professor A.A. Fel'dbaum of the Institut avtomatiki i telemekhaniki Gosudarstvennogo komiteta po avtomatizatsii i mashinostroyeniyu (Institute of Automation and Telemechanics of the State Committee for Automation and Machinebuilding). The existing use and potential development of cybernetic methods and devices in medicine are also discussed. Important achievements have been reached by B.L. Astaurov, Corresponding Member of the Academy of Sciences, as regards sex and heredity. It has become necessary to design electronic devices for controlling the vital activity during operations. It is concluded that fast scientific progress and the solution of all tasks imposed on Soviet science is impossible without the introduction of cybernetic ideas and methods.

Card 2/2

BERG, A.I.

Role of radio electronics and cybernetics in the new program of  
the CPSU. Radiotekh. i. elektron. 7 no.3:363-368 Mar '62. (MIRA 15:2)  
(Communism)  
(Electronics)

PEKELIS, V.D.; BERG, A., akademik, red.; KOL'MAN, E., akademik, red.;  
RYCHKOVA, N.G., red. izd-va; PRUSAKOVA, T.A., tekhn. red.

[The possible and impossible in cybernetics] Vozmozhnoe i  
nevozmozhnoe v kibernetike; sbornik statei. Moskva, Izd-vo  
AN SSSR, 1963. 221 p.

\*

BERG, A.I., glav. red.; TRAPEZNIKOV, V.A., glav. red.; BOCHAROVA,  
M.D., kand. tekhn. nauk, st. nauchn. red.; DELONE, N.N.,  
inzh., st. nauchn. red.; BARANOV, V.I., nauchn. red.;  
ZABELINA, Ye.P., mlad. red.; PAVLOVA, T.I., tekhn.red.

[Automation of production processes and industrial  
electronics; encyclopedia of modern technology] Avtomati-  
zatsiia proizvodstva i promyshlennaia elektronika; entsi-  
klopediia sovremennoi tekhniki. Glav. red. A.I.Berg i  
V.A.Trapeznikov. Moskva, Sovetskaiia entsiklopediia.  
Vol.2. K - Pogreshnost' izmereniia. 1963. 528 p.

(MIRA 16:12)

(Automation—Dictionaries)  
(Electric engineering—Dictionaries)

BERG, Aksel' Ivanovich, akademik; MEL'NIKOVA, Zh.I., red.;  
RAKITIN, I.T., tekhn. red.

[Cybernetics and reliability] Kibernetika i nadezhnost'.  
Moskva, Izd-vo "Znanie," 1963. 30 p. (Novoe v zhizni, nauke,  
tekhnike. IV Seriya: Tekhnika, no.21) (MIRA 16:12)

1. Chlen-korrespondent AN SSSR (for Berg).  
(Automatic control)  
(Electronic industries--Quality control)

BERG, A.I., akademik

Encyclopedia "Automation of Industrial Production and Electronics  
in Industry." Biul.tekh.-ekon.inform.Gos.nauch.-issl.inst.nauch.i  
tekh.inform. no.9:51-52 '63. (MIRA 16:10)



BERG, A.I.

"Automation of Production Processes and Industrial Electronics,"  
the New Soviet Encyclopedia. Nauka polska 11 no.2:137-138 Mr-Apr  
'63.

1. Członek rzeczywisty Akademii Nauk ZSRR i redaktor naczelny  
encyklopedii, Moskwa.

BERG, Aksel' Ivanovich; SHAMSHUR, V.I., red.

[Cybernetics, the science of optimal control] Kibernetika -  
nauka ob optimal'nom upravlenii. Moskva, Izd-vo "Energia,"  
1964. 63 p. (Massovaia radiobiblioteka, no.525)  
(MIRA 17:5)

BERG, Akseil' Ivanovich, akademik, Geroy Sotsialisticheskogo Truda;  
SHAMSHUR, V.I., red.

[Selected works] Izbrannye trudy. Moskva, Izd-vo "Energiia."  
Vol.1. 1964. 167 p. (MIRA 17:6)

BERG, A.I., akademik, red.; BRUYEVICH, N.G., akademik, red.;  
GNEDENKO, B.V., akademik, red.; SHANGHUR, V.I., red.

[Cybernetics in the service of communism] Kibernetika na  
sluzhu kommunizma. Moskva, Energiia. Vol.2. [Theory of  
reliability and the queueing theory] Teoriia nadezhnosti  
i teoriia massovogo obsluzhivaniia; sbornik statei. 1964.  
367 p. (MIRA 17:11)

1. Akademiya nauk SSSR (for Berg, Bruyevich, Gnedenko).

BERG, A.I., glav. red.; TRAPEZNIKOV, V.A., glav. red.; TSYPKIN, Ya.Z., doktor tekhn. nauk, prof., red.; VORONOV, A.A., doktor tekhn. nauk, prof., red.; SOTSKOV, B.S., doktor tekhn. nauk, red.; AGEYKIN, D.I., doktor tekhn. nauk, red.; GAVRILOV, M.A., red.; VENIKOV, V.A., doktor tekhn. nauk, prof., red.; CHELYUSTKIN, A.B., doktor tekhn. nauk, red.; PROKOF'YEV, V.N., doktor tekhn. nauk, prof., red.; IL'IN, V.A., doktor tekhn. nauk, prof., red.; KITOV, A.I., doktor tekhn. nauk, red.; KRINITSKIY, N.A., kand. fiz.-matem. nauk, red.; KOGAN, B.Ya., doktor tekhn. nauk, red.; USHAKOV, V.B., doktor tekhn. nauk, red.; LERNER, Yu.A., doktor tekhn. nauk, prof., red.; FEL'DBAUM, A.A., prof., doktor tekhn. nauk, red.; SHREYDER, Yu.A., kand. fiz.-mat. nauk, dots., red.; KHARKEVICH, A.A., akad., red.; TIMOFEYEV, P.V., red.; MASLOV, A.A., dots., red.; LEVIN, G.A., prof., red.; LOZINSKIY, M.G., doktor tekhn. nauk, red.; NETUSHIL, A.V., doktor tekhn. nauk, prof., red.; POPKOV, V.I., red.; ROZENBERG, L.D., doktor tekhn. nauk, prof., red.; LIVSHITS, A.L., kand. tekhn. nauk, red.

[Automation of production and industrial electronics] Avtomatizatsiya proizvodstva i promyshlennaya elektronika; entsiklopediya sovremennoi tekhniki. Moskva, Sovetskaya Entsiklopediya. Vol.3. Pogreshnost' resheniya - Teleizmeritel'naya sistema chastotnaya. 1964. 487 p. (MIRA 17:10)

J. Chlen-korrespondent AN SSSR (for Sotskov, Gavrilov, Timofeyev, Popkov).

BERG, A.I., akad., red.; BIRYUKOV, B.V., red.; NOVIK, I.B., red.;  
KUZNETSOV, I.V., red.; SPIRKIN, A.G., red.; KYZHOVA, M., red.

[Cybernetics, thought, and life] Kibernetika, myshlenie,  
zhizn'. Moskva, Mysl', 1964. 510 p. (MIRA 17:12)

BERG, Akcel' Ivanovich, akademik; MEL'NIKOVA, Zh.M., red.

[Cybernetics and reliability] Kibernetika i nadezh-  
nost'. Moskva, Znanie, 1964. 94 p. (Novoe v zhizni,  
nauke, tekhnike. IV Seriya: Tekhnika, no.21-22)  
(MIRA 17:12)

KELER, V.R., otv. red.; MILLIONSHCHIKOV, M.D., akademik, red.;  
 BLOKHIN, N.N., red.; BLOKHINTSEV, D.I., red.; GNEDENKO,  
 B.V., akademik, red.; ZAYCHIKOV, V.N., red.; KELDYSH, M.V.,  
 akademik, red.; KIRILLIN, V.A., akademik, red.; KORT'NOV,  
 V.V., red.; MONIN, Andrey *Sergayevich*, prof., doktor fiz.-  
 matem. nauk, red. (1921); NESMEYANOV, A.N., akademik, red.;  
 PARIN, V.V., red.; REBINDER, F.A., akademik, red.; SEMENOV,  
 N.N., akademik, red.; FOK, V.A., akademik, red.; FRANTSOV,  
 G.P., akademik, red.; ENGEL'GARDT, V.A., akademik, red.;  
 KREMNEVA, G., red.; BALASHOVA, A., red.; BERG, A.I., akademik, red.

[Science and mankind, 1964; simple and precise information  
 about the principal developments in world science] Nauka i  
 chelovechestvo, 1964.; dostupno i tochno o glavnom v miro-  
 voi nauke. Moskva, Izd-vo "Znanie," 1964. 424 p.

(MIRA 18:1)

1. Deystvitel'nyy chlen AMN SSSR (for Blokhin, ~~Parin~~). 2. Chlen-  
 korrespondent AN SSSR (for Blokhintsev). 3. Akademiya nauk  
 SSSR Ukr. SSR (for Gnedenko).



BERG, A.I., akademik, Geroy Sotsialisticheskogo Truda

State standardization and correlating information.  
Standartizatsiia 28 no.10:36-39 0 '64.

(MIRA 17:12)

KELER, Vladimir Romanovich; BERG, A.I., nauchn. red.

[Homo sapiens - man of reason] Homo sapien. - Chelovek  
razumnyi. Nauchn. red. A.I.Berg. Moskva, Molodaia  
gvardiia, 1964. 220 p. (MIRA 18:4)

BERG, A.I., glav. red.; TRAPEZNIKOV, V.A., glav. red.; TSYFKIN, Ya.Z., doktor tekhn. nauk, prof., red.; VORONOV, A.I., prof., red.; AGEYKIN, D.I., doktor tekhn. nauk, red.; GAVRILOV, M.A., red.; VENIKOV, V.A., doktor tekhn. nauk, prof., red.; SOTSKOV, B.S., red.; CHELYUSTKIN, A.B., doktor tekhn. nauk, red.; PROKOF'YEV, V.N., doktor tekhn. nauk, prof., red.; IL'IN, V.A., doktor tekhn. nauk, prof., red.; KITOV, A.I., doktor tekhn. nauk, red.; KRINITSKIY, N.A., kand. fiz. mat. nauk, red.; KOGAN, B.Ya., doktor tekhn. nauk, red.; USHAPOV, V.B., doktor tekhn. nauk, red.; LERNER, A.Ya., doktor tekhn. nauk, prof., red.; FEL'DBAUM, A.A., doktor tekhn. nauk, prof., red.; SHREYDER, Yu.A., kand. fiz.-mat. nauk, red.; KHARKEVICH, A.A., akademik, red. [deceased]; TIMOFEYEV, P.V., red.; MASLOV, A.A., dots., red.; TRUTKO, A.F., inzh., red.; LEVIN, G.A., prof., red.; LOZINSKIY, M.G., doktor tekhn. nauk, red.; NETUSHIL, A.V., doktor tekhn. nauk, prof., red.; POPKOV, V.I., red.; ROZENBERG, L.D., doktor tekhn. nauk, prof., red.; LIFSHITS, A.L., kand. tekhn. nauk, red.; AVEN, O.I., kand. tekhn. nauk, red.; BLANN, O.M. [Blunn, O.M.], red.; BROIDA, V., inzh., prof., red.; BREKHL, L. [brockl, L.] inzh., knad. nauk, red.; VAYKHARDT, Kh. [Weichardt, H.], inzh., red.; BOCHAROVA, M.D., kand. tekhn. nauk, st. nauchn. red.

[Automation of production processes and industrial electronics]  
 Avtomatizatsiya proizvodstva i promyshlennaya elektronika; entsiklopediya sovremennoy tekhniki. Moskva, Sovetskaya entsiklopediya.  
 Vol.4. 1965. 543 p. (TRA 18:6)

GAAZE-RAPOPORT, M.G., otv. red.; YAKOBI, V.E., otv. red.;  
BERG, A.I., red.; GURFINKEL', V.S., red.; KOVALEVSKIY,  
V.A., red.; KLEYNENBERG, S.Ye., red.; MANTEYFEL', B.P.,  
red.; NAUMOV, N.P., red.; PARIN, V.V., red.; POLYANTSEV,  
V.A., red.; SOTSKOV, B.S., red.;

[Bionics] Bionika. Moskva, Nauka, 1965. 475 p. (MIRA 18:12)

1. Akademiya nauk SSSR. Nauchnyy sovet po kompleksnoy probleme.  
"Kibernetika."

ACC NR: AM5025167

MONOGRAPH

UR

Berg, Aksel' Ivanovich (Academician)

Selected works (Izbrannyye trudy) v. 2. Moscow, Izd-vo "Energiya", 1964. 223 p.  
Errata slip inserted. 1,600 copies printed.

TOPIC TAGS: automation, automatic control, cybernetics, optimal automatic control, reliability engineering, radio equipment, electronic equipment

PURPOSE AND COVERAGE: This book contains 24 selected articles, lectures, reports, and speeches published in various periodicals since 1957. The selected works, dealing with cybernetics and reliability of radioelectronic equipment, point out the many-sidedness and exceptional value of cybernetics as a science of optimal control for use in various fields of science, engineering, industry, and economics. The book is intended for people interested in the development and practical application of cybernetics.

TABLE OF CONTENTS: [abridged]:

Foreword - - 5

Problems of reliability - - 7

Cord 1/2

ACC NR: AM5025167

Cybernetics --- 34  
Miscellaneous - - 182

SUB CODE: 13,06,17/ SUM DATE: 02Jul64/ SOV REF: 033/ OTII REF: 006

Card 2/2

BERG, A.M.

3. The program planned for the originally planned Conference was as follows:

a. Plenary Session - 14 December 1959, 1500 hours

- 1) Academician V S Kuznetsov - Introductory Remarks
- 2) Academician A N Berg, A A Lyapunov - Remarks for the Use of ELECTRONIC COMPUTERS in the State Apparatus
- 3) Professor V V Kovachikov - Current Problems in the Application of Mathematical Methods in USSR Economic Research and Planning

b. Working Session - 15 December 1959, 1000 hours

I. Mathematical Analysis of Expanded Reproduction

- 1) P S Melnikovsky - The Use of Balance Systems of Equations in Planning the National Economy

report submitted at the Soviet Conference on Problems in the Application of Mathematical Methods in Economic Research, Leningrad, 18-21 January 1960.

Map: ISSYK-KUL', lake OSU-Am 495 S329  
Berg, A. S.: Sovremennoye Sostoyaniye Rybolovstva  
Materialy Komissii Ekspeditsionnykh Issledovaniy, Vyp.  
11, 1928.  
American Geographical Society, New York City  
Map of the lake, scale 1:400,000. Inserts: Village  
Rybach'ye, scale 1:60,000. Harbor Karakol'skoye, scale  
1:40,000. Depth shown.

120



SAVEL'YEV, A.P.; LAPITSKAYA, O.I.; BERG, A.V.

Technical and economic comparison of methods for separating  
gases in the petrochemical plants of Bashkiria. Trudy  
BashNII NP no.7:163-169 '64. (MIRA 17:9)

BELIBASH, B. A.; SHIDLOVSKIY, M. F. and PEYVE, V. V.;  
CHERENSKIY, V. Ye.; VENETSIANOV, Ye. A.; MOVSESOV, N. S.;

"The Case for Explosion-proof Electrical Equipment in the Oil and Gas Industries."

report presented at the All-Union Scientific and Technical Conference on the  
Electrical Equipment in Buildings and Outside Installations Liable to Explo-  
sions, 14-19 April 1958, Stalino.  
(Energet. Byulleten, 1958, No. 7, pp 29-33).

BERG, A.Ya.

In defense of a valuable meat breed of cattle. Zhivotnovodstvo  
21 no.1:25-26 Ja '59. (MIRA 12:2)

1. Glavnyy zootekhnik po plemennomu delu Karagandinskogo obl'sel'-  
khozupravleniya.  
(Karaganda Province—Cattle breeds)

AUTHOR: Berg, B.A. (Leningrad) 40-22-1-6/15  
TITLE: On Deformation Anisotropy (O deformatsionnoy anizotropii)  
PERIODICAL: Prikladnaya Matematika i Mekhanika, 1958, Vol 22, Nr 1,  
pp 67-77 (USSR)

ABSTRACT: In this paper a deformation-anisotropy is understood to be an anisotropy which arises in the body by a previous deformation. The following problem is considered: From a certain initial state a body is subject to two different elastic deformations one after another. It is shown that, if the first deformation is homogeneous and does not correspond to the uniform universal push or pull state, in the second deformation the body in general behaves like an orthotropic body. The main directions of elasticity of this orthotropic body coincide with the main axes of the homogeneous deformation, and the elastic constants can be expressed by the constants of the original first deformation of the body. This knowledge renders possible to apply the set-ups of the theory of anisotropic bodies for the solution of the problem. As an example the author calculates the simultaneous torsion on a drawn bar, furthermore the existence of bending for a plate which is

Card 1/2

On Deformation Anisotropy

40-22-1-6/15

drawn on the one hand and subject to a tangential stress on the other hand. There are 2 figures, and 13 references, 6 of which are Soviet, 1 British, 1 American and 1 French.

SUBMITTED: July 2, 1955

Card 2/2

ACC NR: AP6024637

CE/EMI(M)/EWP(t)/ETI IJP(c) JD/WW/WH  
SOURCE CODE: UR/0170/66/011/001/0042/0047

AUTHOR: Berg, B. V.; Baskakov, A. P.

ORG: Polytechnic Institute, Sverdlovsk (Politekhicheskiy Institut)

TITLE: Experimental study of heat exchange between a fluidized bed and a cylindrical surface

SOURCE: Inzhenerno-fizicheskiy zhurnal, v. 11, no. 1, 1966, 42-47

TOPIC TAGS: heat exchange, industrial heat exchanger, heat process, fluidized bed, WIRE, CORUNDUM, HEAT TRANSFER COEFFICIENT

ABSTRACT: In conjunction with the investigation of heat treatment of wires in fluidized beds, the authors carried out the experimental verification of the influence of wire cylinder radius on heat exchange, and the heat exchange of a cylinder moving transversely in a fluidized bed. Specific studies were made of heat transfer between a fluidized bed of corundum particles of 60, 120, and 320 microns and fixed, cylindrical, varying diameter (3-20 mm) calorimeters, as well as between the particles and a cylinder 10 mm in diameter moving in a transverse direction. The heat transfer coefficient is found to increase appreciably with the decrease in cylinder diameter. Above 10 mm the diameter ceases to affect the heat transfer. A transverse motion of cylinders augments the heat transfer rate. These results disagree with the

Card 1/2

UDC: 541.182

ACC NR: AP6024637

conclusions of R. Ernst (Chemie-Ingenieur-Technik, No. 3, 166-173, 1959). Orig. art. has:  
3 figures.

SUB CODE: 20/ SUBM DATE: 19Jan66/ ORIG REF: 010/ OTH REF: 003

Card 2/2 *LC*

USSR / Cultivated Plants. Fodder Crops.

M-5

Abs Jour : Kof Zhur - Biologiya, No 13, 1958, No. 58647

Author : Borg, D. N.; Kilikeeva, M. A.

Inst : Molotov University

Title : Alfalfa Sowings in Kolchoz' of the Molotov Oblast'

Orig Pub : Izv. Yestestv. nauchn. in-ta pri Molotovsk. un-te,  
1957, 13, No 10, 65-74

Abstract : No abstract given

Card 1/1



MASAGUTOV, R.M.; BERG, G.A.

Modified design of an outlet for flue gases in a regenerator.  
Trudy BashNII NP no.1:136-144 '59. (MIRA 12:6)  
(Catalysts) (Chemical apparatus)

EYGENSON, A.S.; MASAGUTOV, R.M.; ZAITOVA, A. Ya.; VOLKOVA, L.I.; BERG, G.A.;  
YEFINOVA, A.K.

Effect of some physicochemical properties of raw stock on  
catalytic cracking indices. Trudy. Bash NII NP no. 3:19-32  
'60. (MIRA 14:4)

(Cracking process)

MASAGUTOV, R.M.; BERG, G.A.

Effect of the quality of raw material on the activity of the aluminosilicate catalyst. Khim.i tekhn. topl.i masel 6 no.3:18-22 Mr '61.

(MIRA 14:3)

1. Bashkirskiy nauchno-issledovatel'skiy institut neftyanoy promyshlennosti.

(Aluminosilicates)

11.0140

28036  
S/001/61/000/015/116/139  
B102/B101

AUTHORS: Marushkin, B. K., Berg, G. A., Sidorocheva, L. V.,  
Baydavletova, F. G.

TITLE: Extractive deparaffination of diesel fuel

PERIODICAL: Referativnyy zhurnal. Khimiya, no. 15, 1961, 480, abstract  
15M192 (Sb. tr. Ufimsk. neft. in-ta, no. 3, 1960, 187 - 194)

TEXT: Deparaffination of the diesel fraction of Devonian petroleum (boiling point, 200 - 350°C; specific weight, 0.837; solidification point, -12°C; content of n-paraffines, 26% by weight) was used as an example to show that phenol extraction is a useful method for deparaffination of directly fractionated fuel. The separation of n-paraffins is considerably improved if the number of extraction stages is increased and if relatively narrow fractions are separated. A sharp increase of the phenol consumption improves the indices obtained only little. The clearness of separation attained in the experiments was insufficient to obtain a winter sort of diesel fuel solidification point, -35 or -45°C. It is, however, possible to improve the indices of the process if solvents of higher selectivity are

Card 1/2

41

Extractive deparaffination of...

25036  
S/081/61/000/015/116/139  
B102/B101

chosen. [Abstracter's note: Complete translation.]

✓

Card 2/2

S/081/61/000/013/011/028  
B110/B205

AUTHORS: Masagutov, R. M., Berg, G. A., Eygenson, A. S.

TITLE: Purification of the raw material of catalytic cracking by means of sulfuric acid

PERIODICAL: Referativnyy zhurnal. Khimiya, no. 13, 1961, 516, abstract 13M205 (Tr. Bashkirsk. n.-1. in-t po pererabotke nefi, 1960, vyp. 4, 15-30)

TEXT: For the purpose of developing a simple and inexpensive method of preparing the raw material of catalytic cracking, attempts have been made to purify vacuum gas oils with sulfuric acid with subsequent catalytic cracking of the purified raw material. It was shown that an abrupt change in the equilibrium of catalytic cracking occurs if the raw material is purified with a > 80 % acid. Purifying the raw material with 2 % by volume of a 95 % acid increases the yield of gasoline and gas oil in catalytic cracking by 7-9 and 3-4 % by weight, respectively, for raw material from Tuymazy, and by 13-24 and 11-12 % by weight for raw material from Arlan. The yield of coke is lowered correspondingly. Intensified purification of the raw material

Card 1/2

Purification of the raw material...

S/081/61/000/013/011/028  
B110/B205

increases the content of aromatics in catalytically cracked gasolines, and lowers the content of sulfurous and unsaturated compounds. An analysis of the material equilibrium makes it possible to recommend the purification of vacuum gas oils of sulfurous petroleum with sulfuric acid as a suitable method for preparing the raw material for catalytic cracking. [Abstracter's note: Complete translation.]

Card 2/2

26519  
S/065/61/000/008/002/009  
E030/E135

11.0140

AUTHORS: Masagutov, R.M., Berg, G.A., and Volkova, L.I.  
TITLE: The effect of degree of hydrofining feedstock for  
catalytic cracking  
PERIODICAL: Khimiya i tekhnologiya topliv i masel, 1961, <sup>6</sup> No.8,  
pp. 8-13

TEXT: This experimental investigation was to improve the  
yield and quality on cat. cracking high-sulphur, high-coking  
crudes such as Chekmagush and Arlan; for such crudes, hydrofining  
is an obvious approach. Work was on the laboratory scale. The  
hydrofiner unit held 200 ml aluminocobalt molybdate catalyst,  
and the cat. cracker used alumino-silicate catalyst, of activity  
32-33 points. Cat. cracker space velocities were 0.7, 1.0 or  
1.5 per hour, and the cycle time 30 minutes. For hydrofining,  
optimum conditions were virtually independent of space velocity  
and consisted of 50 kg/cm<sup>2</sup> gas pressure and 370°C temperature.  
Comparing hydrofined and unhydrofined material under cracking  
conditions with identical coke formation (4.5% weight), the output  
of benzene fraction was increased from 36 to 61.5%.  
Card 1/2



The effect of degree of hydrofining..

26519

S/065/61/000/008/002/009  
E030/E135

In order to obtain 1% sulphur diesel fuel from Chekmagush feed, it was necessary to hydrofine at 370°C, 50 kg/cm<sup>2</sup> pressure, and 0.8-1.0 per hour space velocity.

There are 7 figures and 2 tables, and 22 references: 10 Soviet and 12 non-Soviet. The English-language references read as follows:  
Ref.13: Viland, C.K. Petroleum Refiner, 36, No.3, 197-220, 1958;  
Ref.14: Samnelson, G.I.; Woelflin, W. Petr. Ref., 38, No.3, 211-223, 1959; Ref.16: Abbott, M.D., Archibald, R.C., Dorn, R.W. Oil and Gas J., 56, No.20, 144, 1958; Williams, C.C., Abbott, M.D. Petrol. Eng. 32, No.5, 25-28, 1960.

ASSOCIATION: BashNII NP

Card 2/2

1 122-1-1

FFZ/6/EST(1)/RDS ABETO/ABCO 12/1 12/1

107

AUTORS: Kuznetsov, B. M., Berg, G. A., Volkova, L. I.

TITLE: Combinations of preparation of raw material for the synthesis of  
the and obtaining of neutral ascorbic

PERIODICAL: Referativnyy zhurnal, Khimiya, no. 5, 1963, 444-445, 446-447, 448-449, 450-451, 452-453, 454-455, 456-457, 458-459, 460-461, 462-463, 464-465, 466-467, 468-469, 470-471, 472-473, 474-475, 476-477, 478-479, 480-481, 482-483, 484-485, 486-487, 488-489, 490-491, 492-493, 494-495, 496-497, 498-499, 500-501, 502-503, 504-505, 506-507, 508-509, 510-511, 512-513, 514-515, 516-517, 518-519, 520-521, 522-523, 524-525, 526-527, 528-529, 530-531, 532-533, 534-535, 536-537, 538-539, 540-541, 542-543, 544-545, 546-547, 548-549, 550-551, 552-553, 554-555, 556-557, 558-559, 560-561, 562-563, 564-565, 566-567, 568-569, 570-571, 572-573, 574-575, 576-577, 578-579, 580-581, 582-583, 584-585, 586-587, 588-589, 590-591, 592-593, 594-595, 596-597, 598-599, 600-601, 602-603, 604-605, 606-607, 608-609, 610-611, 612-613, 614-615, 616-617, 618-619, 620-621, 622-623, 624-625, 626-627, 628-629, 630-631, 632-633, 634-635, 636-637, 638-639, 640-641, 642-643, 644-645, 646-647, 648-649, 650-651, 652-653, 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876-877, 878-879, 880-881, 882-883, 884-885, 886-887, 888-889, 890-891, 892-893, 894-895, 896-897, 898-899, 900-901, 902-903, 904-905, 906-907, 908-909, 910-911, 912-913, 914-915, 916-917, 918-919, 920-921, 922-923, 924-925, 926-927, 928-929, 930-931, 932-933, 934-935, 936-937, 938-939, 940-941, 942-943, 944-945, 946-947, 948-949, 950-951, 952-953, 954-955, 956-957, 958-959, 960-961, 962-963, 964-965, 966-967, 968-969, 970-971, 972-973, 974-975, 976-977, 978-979, 980-981, 982-983, 984-985, 986-987, 988-989, 990-991, 992-993, 994-995, 996-997, 998-999, 1000-1001, 1002-1003, 1004-1005, 1006-1007, 1008-1009, 1010-1011, 1012-1013, 1014-1015, 1016-1017, 1018-1019, 1020-1021, 1022-1023, 1024-1025, 1026-1027, 1028-1029, 1030-1031, 1032-1033, 1034-1035, 1036-1037, 1038-1039, 1040-1041, 1042-1043, 1044-1045, 1046-1047, 1048-1049, 1050-1051, 1052-1053, 1054-1055, 1056-1057, 1058-1059, 1060-1061, 1062-1063, 1064-1065, 1066-1067, 1068-1069, 1070-1071, 1072-1073, 1074-1075, 1076-1077, 1078-1079, 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1808-1809, 1810-1811, 1812-1813, 1814-1815, 1816-1817, 1818-1819, 1820-1821, 1822-1823, 1824-1825, 1826-1827, 1828-1829, 1830-1831, 1832-1833, 1834-1835, 1836-1837, 1838-1839, 1840-1841, 1842-1843, 1844-1845, 1846-1847, 1848-1849, 1850-1851, 1852-1853, 1854-1855, 1856-1857, 1858-1859, 1860-1861, 1862-1863, 1864-1865, 1866-1867, 1868-1869, 1870-1871, 1872-1873, 1874-1875, 1876-1877, 1878-1879, 1880-1881, 1882-1883, 1884-1885, 1886-1887, 1888-1889, 1890-1891, 1892-1893, 1894-1895, 1896-1897, 1898-1899, 1900-1901, 1902-1903, 1904-1905, 1906-1907, 1908-1909, 1910-1911, 1912-1913, 1914-1915, 1916-1917, 1918-1919, 1920-1921, 1922-1923, 1924-1925, 1926-1927, 1928-1929, 1930-1931, 1932-1933, 1934-1935, 1936-1937, 1938-1939, 1940-1941, 1942-1943, 1944-1945, 1946-1947, 1948-1949, 1950-1951, 1952-1953, 1954-1955, 1956-1957, 1958-1959, 1960-1961, 1962-1963, 1964-1965, 1966-1967, 1968-1969, 1970-1971, 1972-1973, 1974-1975, 1976-1977, 1978-1979, 1980-1981, 1982-1983, 1984-1985, 1986-1987, 1988-1989, 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2172-2173, 2174-2175, 2176-2177, 2178-2179, 2180-2181, 2182-2183, 2184-2185, 2186-2187, 2188-2189, 2190-2191, 2192-2193, 2194-2195, 2196-2197, 2198-2199, 2200-2201, 2202-2203, 2204-2205, 2206-2207, 2208-2209, 2210-2211, 2212-2213, 2214-2215, 2216-2217, 2218-2219, 2220-2221, 2222-2223, 2224-2225, 2226-2227, 2228-2229, 2230-2231, 2232-2233, 2234-2235, 2236-2237, 2238-2239, 2240-2241, 2242-2243, 2244-2245, 2246-2247, 2248-2249, 2250-2251, 2252-2253, 2254-2255, 2256-2257, 2258-2259, 2260-2261, 2262-2263, 2264-2265, 2266-2267, 2268-2269, 2270-2271, 2272-2273, 2274-2275, 2276-2277, 2278-2279, 2280-2281, 2282-2283, 2284-2285, 2286-2287, 2288-2289, 2290-2291, 2292-2293, 2294-2295, 2296-2297, 2298-2299, 2300-2301, 2302-2303, 2304-2305, 2306-2307, 2308-2309, 2310-2311, 2312-2313, 2314-2315, 2316-2317, 2318-2319, 2320-2321, 2322-2323, 2324-2325, 2326-2327, 2328-2329, 2330-2331, 2332-2333, 2334-2335, 2336-2337, 2338-2339, 2340-2341, 2342-2343, 2344-2345, 2346-2347, 2348-2349, 2350-2351, 2352-2353, 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2536-2537, 2538-2539, 2540-2541, 2542-2543, 2544-2545, 2546-2547, 2548-2549, 2550-2551, 2552-2553, 2554-2555, 2556-2557, 2558-2559, 2560-2561, 2562-2563, 2564-2565, 2566-2567, 2568-2569, 2570-2571, 2572-2573, 2574-2575, 2576-2577, 2578-2579, 2580-2581, 2582-2583, 2584-2585, 2586-2587, 2588-2589, 2590-2591, 2592-2593, 2594-2595, 2596-2597, 2598-2599, 2600-2601, 2602-2603, 2604-2605, 2606-2607, 2608-2609, 2610-2611, 2612-2613, 2614-2615, 2616-2617, 2618-2619, 2620-2621, 2622-2623, 2624-2625, 2626-2627, 2628-2629, 2630-2631, 2632-2633, 2634-2635, 2636-2637, 2638-2639, 2640-2641, 2642-2643, 2644-2645, 2646-2647, 2648-2649, 2650-2651, 2652-2653, 2654-2655, 2656-2657, 2658-2659, 2660-2661, 2662-2663, 2664-2665, 2666-2667, 2668-2669, 2670-2671, 2672-2673, 2674-2675, 2676-2677, 2678-2679, 2680-2681, 2682-2683, 2684-2685, 2686-2687, 2688-2689, 2690-2691, 2692-2693, 2694-2695, 2696-2697, 2698-2699, 2700-2701, 2702-2703, 2704-2705, 2706-2707, 2708-2709, 2710-2711, 2712-2713, 2714-2715, 2716-2717, 2718-2719, 2720-2721

Card 1/2

Combinations of preparation .....

S/081/63/000/005/051/075

H.S. Gasoline, extracted in cracking of refined gas oil.

S/744/62/000/005/002/003  
I060/I260

AUTHORS: Masagutov, R.M., Berg, G.A., and Volkova, L.I.

TITLE: Preliminary purification by hydrogenation of crude oils treated by catalytic cracking

SOURCE: Ufa. Bashkirskiy nauchno-issledovatel'skiy institut po pererabotke nefti. Trudy. no. 5. 1962. Sernistyie nefti i produkty ikh pererabotki. 77-88

TEXT: The process of catalytic cracking is particularly sensitive to impurities contained in crude oils, like nitrogen and various metals, which tend to poison the catalyst, with a consequent increase of the amount of coke at the expense of lighter fractions.

The author concludes that the best method of purification is by hydrogenation, apart from the drawback of requiring large amounts of hydrogen, depending on the quantities of crude treated and the intensity of the hydrogenation process.

Experiments by the author give the optimum conditions for purification prior to catalytic cracking as: pressure 50 atm., temperature 370°C,

Card 1/2

Preliminary purification...

S/744/62/000/005/002/003  
I060/I260

circulation of hydrogen 800 ml/l of crude oil, volumetric velocity of crude  
supply from 0.5 to 10 hrs, <sup>-1</sup> depending on the required intensity of hydro-  
generation.

There are 8 figures and 2 tables.

Card 1/1

... .. A.S. "PIK"

... .., Sultanov, A. D., ... ..  
... .., ... .., ... .., ... ..

**TITLE:** Activity of Al-Co-Mo and Al-Ni-Mo catalysts in hydro-refining of diesel fuels

... .. AN ... .., no. ... ..

... .. diesel fuels; hydro-refining; Al-Co-Mo ... ..

**TRANSLATION:** Data are presented on hydro-refining of diesel fuels ... ..  
... ..

Cord 1/2

Cord 2/2

MASACUTOV, R.M.; BERG, G.A.; RISOV, B.Ya.; KONDARKOV, D.I.; GOLENKOVA, M.V.;  
KULINICH, G.M.; SKUNDINA, L.Ya.

Using gases of hydroforming processes. Trudy BashNII NP  
no.6:5-10 '63.

Using hydrogenation to purify a hydroforming product of  
catalysis. Ibid.:10-14 (MIRA 17:5)



MASAGUTOV, R.M.; BERG, G.A.; KIRILLOV, T.S.; VARFOLOMEYEV, D.F.; KULINICH,  
G.M.; SKUNDINA, L.Ya.

Hydrofining of diesel fuel from high sulfur-bearing crude with a  
decreased consumption of hydrogen. Khim. i tekhn. topl. i masel  
8 no.12:7-12 D '63. (MIRA 17:1)

1. Bashkirskiy nauchno-issledovatel'skiy institut po pererabotke  
nefti i Ufimskiy neftepererabatyvayushchiy zavod.

ACCESSION NR: AP4036978

S/0065/64/000/005/0017/0022

AUTHOR: Masagutov, R. M.; Berg, G. A.; Varfolomeyev, D. P.; Selivanov  
T. I.; Bugay, Ye. A.; Mukhametov, M. N.; Kulinich, G. M.; Sokolova,  
V. I.

TITLE: Development of a process for high-purity cyclohexane

SOURCE: Khimiya i tekhnologiya topliv i masel, no. 5, 1964, 17-22

TOPIC TAGS: cyclohexane, benzene, benzene hydrogenation, catalyst,  
nickel on kieselguhr, benzene purification, thiophene, sulfur com-  
pound, cyclohexane production

ABSTRACT: An industrial process for cyclohexane has been developed  
on the basis of preliminary pilot tests. Cyclohexane of adequate  
purity was produced by the one-step hydrogenation of benzene (cyclo-  
hexane content, < 0.4%; thiophene content, < 0.00001%) on technical-  
grade nickel on kieselguhr catalyst under the following conditions:  
pressure 10 kg/cm<sup>2</sup> gage; space velocity of benzene feed, 0.5—0.6 hr<sup>-1</sup>;  
maximum reactor temperature, 120—150C; hydrogen/benzene ratio, 3000

Card 1/3

ACCESSION NR: AP4036978

$\text{m}^3/\text{m}^3$ . Catalyst activity did not drop after 15 days of continuous service. However, the degree of conversion of benzene containing 0.08% thiophene and 0.010% carbon disulfide dropped rapidly from 100 to 60%. Thus, a study was made of the possibilities for the preliminary purification of benzene to remove sulfur compounds. The study took into account data from the literature which indicate that thiophene in contact with the catalyst surface simultaneously blocks five active nickel atoms. In hydrogen the adsorbed thiophene molecule can decompose with the formation of a hydrocarbon molecule and of an S atom. The S atom combines with a nickel atom, but the hydrocarbon molecule desorbs from the catalyst surface, liberates four previously bound Ni atoms, and increases the S adsorption capacity of the catalyst. The results of the study and laboratory experiments have made it possible to develop a large-scale unit for the production of cyclohexane from benzene (containing 0.1—0.8% cyclohexene, up to 0.03% hexane, 0.02% other hydrocarbons, and 0.01—0.04% total sulfur) under the following [approximative] conditions: pressure, normal; temperature, 110 to 150C; space velocity of benzene feed,  $0.2\text{--}0.85\text{hr}^{-1}$ ; hydrogen/benzene molar ratio, 9.5—20. The process is conducted in

Card 2/3

ACCESSION NR: AP4036978

two steps: purification of benzene from S compounds and hydrogenation on two reactors connected in series. The unit has been in operation for two years. The cyclohexane is being used for making polyethylene. Orig. art. has: 3 figures and 2 tables.

ASSOCIATION: BashNIINP; OLUNPZ

SUBMITTED: 00

DATE ACQ: 05Jun64

ENCL: 00

SUB CODE: GC

NO REF SOV: 014

OTHER: 006

Card 3/3